



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/617,461	07/11/2003	Bernd Matthes	03105/DKT01041	3246

43215 7590 12/07/2004

BORGWARNER INC.
PATENT DEPARTMENT
3800 AUTOMATION AVE
AUBURN HILLS, MI 48326-1782

EXAMINER

BONCK, RODNEY H

ART UNIT	PAPER NUMBER
----------	--------------

3681

DATE MAILED: 12/07/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/617,461	Applicant(s) MATTHES ET AL.	
	Examiner Rodney H. Bonck	Art Unit 3681	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 October 2004.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7, 10-14 and 16-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-7, 10-14 and 16-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 27 October 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

The following action is in response to the amendment received October 27, 2004.

Drawings

The substitute sheet of drawings was received on October 27, 2004. These drawings are acceptable.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 5, 13, and 17 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. There is no proper antecedent basis for "the grooves", recited in lines 2-3 of claim 5. It is unclear what is meant in claim 13 by the expression "the surface of the friction lining (32v) rising or falling in the radial direction." In claim 17 there is no proper antecedent basis for "the raised surface area", lines 5-6.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

Art Unit: 3681

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-3, 6, 7, 16, 17, and 20 are rejected under 35 U.S.C. 102(b) as being anticipated by Loeffler('360). Loeffler discloses a disk having a core plate a' and friction linings b having an essentially planar surface. The friction lining exhibits at least one area c' of the surface that is raised in comparison to the planar surface and has a spring characteristic. The raised area is formed unitarily with the remaining friction lining, and the raised area is surrounded by groove c. There is greater thickness to the friction lining in the raised area in that the raised areas cause the lining to have a greater axial extent at that area. In this same sense, the core plate also has a greater axial thickness in the raised areas. As seen especially in Figs. 2 and 4 of Loeffler, the core plate forms the raised surface areas.

Claims 1-5, 12, 13, and 17-20 are rejected under 35 U.S.C. 102(b) as being anticipated by Black('949). Black discloses a disk having a core plate 3 and friction linings 2 having an essentially planar surface. The friction lining exhibits at least one area 1 of the surface that is raised in comparison to the planar surface and has a spring characteristic, in this case, elasticity. The raised area is formed unitarily with the remaining friction lining, and the raised area is surrounded by grooves. There is greater thickness to the friction lining in the raised area in that the raised areas. The raised surface is formed as a flat plateau. The surface can be considered to rise and fall in the radial direction as the raised areas are traversed. The Black friction plate is for use in oil and thus can be considered a "wet" disk clutch.

Claims 1, 10, and 11 are rejected under 35 U.S.C. 102(b) as being anticipated by Lindquist('761). Lindquist discloses a disk having a core plate 22 and friction linings 24,26 having an essentially planar surface. The friction lining exhibits at least one area (e.g., 128, Fig. 5) of the surface that is raised in comparison to the planar surface and has a spring characteristic, in this case, elasticity. The friction lining is formed of multiple component pieces. The raised area, such as 128 in Fig. 5, is formed in the manner of a spacer.

Claims 13 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Wemp('016). Wemp discloses a disk having a core plate 20 and friction linings 26. The thickness of the lining as a whole increases from the outside towards the inside. In traversing the friction lining radially the surface can be considered to rise as the inner periphery is approached.

Response to Amendment

The proposed substitute sheet of drawing is approved. Therefore, the objection to the drawings is withdrawn.

The amendments to the specification overcome the objection set forth in the previous Office action. The objection to the specification is withdrawn.

Applicants have removed the multiple dependency in claims 4-12 and 15. Therefore, the objection to those claims under 37 CFR 1.75(c) is withdrawn.

Response to Arguments

Applicant's arguments filed October 27, 2004 have been fully considered but they are not persuasive. Now reciting in claim 1 that the raised surface has "a spring characteristic" is not seen to distinguish over Loeffler. In claim 13, changing the recitation to "rising or falling in the radial direction" is seen as indefinite and thus does not overcome the rejection under 35 USC 112, second paragraph. It is assumed for examination purposes that applicants are referring to increased or decreased plate thickness.

Applicants do not point out how the new claims are thought to distinguish over the art of record. It is the examiner's position that the new claims do not distinguish over the art, as set forth in the above rejections.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the

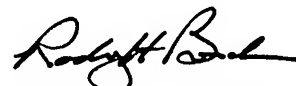
Art Unit: 3681

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rodney H. Bonck whose telephone number is (703)-308-2904. The examiner can normally be reached on Monday-Friday 7:00AM - 3:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Charles A. Marmor can be reached on (703)-308-0830. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Rodney H. Bonck
Primary Examiner
Art Unit 3681

rhb
December 3, 2004